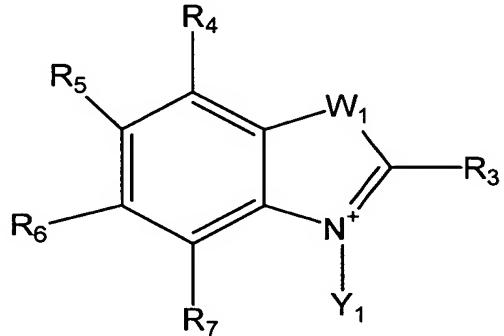


1. A composition comprising a pharmaceutically acceptable formulation of an indole of formula



5 wherein  $R_3$  to  $R_7$ , and  $Y_1$  are independently selected from the group consisting of -H, C1-C10 alkoxy, C1-C10 polyalkoxyalkyl, C1-C20 polyhydroxyalkyl, C5-C20 polyhydroxyaryl, saccharides, amino, C1-C10 aminoalkyl, cyano, nitro, halogen, hydrophilic peptides, arylpolysulfonates, C1-C10 alkyl, C1-C10 aryl,  $-SO_3T$ ,  $-CO_2T$ ,  $-OH$ ,  $-(CH_2)_aSO_3T$ ,  $-(CH_2)_aOSO_3T$ ,

10  $-(CH_2)_aNHSO_3T$ ,  $-(CH_2)_aCO_2(CH_2)_bSO_3T$ ,  $-(CH_2)_aOCO(CH_2)_bSO_3T$ ,

$-(CH_2)_aCONH(CH_2)_bSO_3T$ ,  $-(CH_2)_aNHCO(CH_2)_bSO_3T$ ,

$-(CH_2)_aNHCONH(CH_2)_bSO_3T$ ,  $-(CH_2)_aNHCSNH(CH_2)_bSO_3T$ ,

$-(CH_2)_aOCONH(CH_2)_bSO_3T$ ,  $-(CH_2)_aPO_3HT$ ,  $-(CH_2)_aPO_3T_2$ ,  $-(CH_2)_aOPO_3HT$ ,

$-(CH_2)_aOPO_3T_2$ ,  $-(CH_2)_aNHPO_3HT$ ,  $-(CH_2)_aNHPO_3T_2$ ,

15  $-(CH_2)_aCO_2(CH_2)_bPO_3HT$ ,  $-(CH_2)_aCO_2(CH_2)_bPO_3T_2$ ,

$-(CH_2)_aOCO(CH_2)_bPO_3HT$ ,  $-(CH_2)_aOCO(CH_2)_bPO_3T_2$ ,

$-(CH_2)_aCONH(CH_2)_bPO_3HT$ ,  $-(CH_2)_aCONH(CH_2)_bPO_3T_2$ ,

$-(CH_2)_aNHCO(CH_2)_bPO_3HT$ ,  $-(CH_2)_aNHCO(CH_2)_bPO_3T_2$ ,

$-(CH_2)_aNHCONH(CH_2)_bPO_3HT$ ,  $-(CH_2)_aNHCONH(CH_2)_bPO_3T_2$ ,

20  $-(CH_2)_aNHCSNH(CH_2)_bPO_3HT$ ,  $-(CH_2)_aNHCSNH(CH_2)_bPO_3T_2$ ,

$-(CH_2)_aOCONH(CH_2)_bPO_3HT$ , and  $-(CH_2)_aOCONH(CH_2)_bPO_3T_2$ ,  $-CH_2(CH_2-O-CH_2)_c-CH_2-OH$ ,  $-(CH_2)_d-CO_2T$ ,  $-CH_2-(CH_2-O-CH_2)_e-CH_2-CO_2T$ ,  $-(CH_2)_f-NH_2$ ,  $-CH_2-(CH_2-O-CH_2)_g-CH_2-NH_2$ ,  $-(CH_2)_h-N(R_a)-(CH_2)_i-CO_2T$ , and  $-(CH_2)_j-N(R_b)-CH_2-(CH_2-O-CH_2)_k-CH_2-CO_2T$ ;  $W_1$  is selected from the group consisting of

5  $-CR_cR_d$ ,  $-O-$ , and  $-NR_c$ ;  $a$ ,  $b$ ,  $d$ ,  $f$ ,  $h$ ,  $i$ , and  $j$  independently vary from 1-10;  $c$ ,  $e$ ,  $g$ , and  $k$  independently vary from 1-100;  $R_a$ ,  $R_b$ ,  $R_c$ , and  $R_d$  are defined in the same manner as  $Y_1$ ;  $T$  is either H or a negative charge.

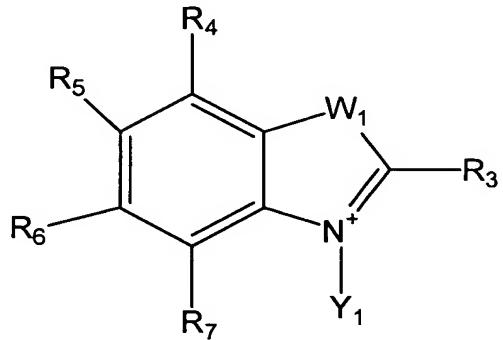
2. The composition of claim 1 wherein  $R_3$  to  $R_7$ , and  $Y_1$  are independently selected from the group consisting of -H, C1-C5 alkoxyl, C1-C5 polyalkoxyalkyl, C1-C10 polyhydroxyalkyl, C5-C20 polyhydroxyaryl, mono- and disaccharides, nitro, hydrophilic peptides, arylpolysulfonates, C1-C5 alkyl,

5 C1-C10 aryl,  $-SO_3T$ ,  $-CO_2T$ ,  $-OH$ ,  $-(CH_2)_aSO_3T$ ,  $-(CH_2)_aOSO_3T$ ,  $-(CH_2)_aNHSO_3T$ ,  $-(CH_2)_aCO_2(CH_2)_bSO_3T$ ,  $-(CH_2)_aOCO(CH_2)_bSO_3T$ ,  $-CH_2(CH_2-O-CH_2)_c-CH_2-OH$ ,  $-(CH_2)_d-CO_2T$ ,  $-CH_2-(CH_2-O-CH_2)_e-CH_2-CO_2T$ ,  $-(CH_2)_f-NH_2$ ,  $-CH_2-(CH_2-O-CH_2)_g-CH_2-NH_2$ ,  $-(CH_2)_h-N(R_a)-(CH_2)_i-CO_2T$ , and  $-(CH_2)_j-N(R_b)-CH_2-(CH_2-O-CH_2)_k-CH_2-CO_2T$ ;  $W_1$  is selected from the group consisting of

10  $-CR_cR_d$ ,  $-O-$ , and  $-NR_c$ ;  $a$ ,  $b$ ,  $d$ ,  $f$ ,  $h$ ,  $i$ , and  $j$  independently vary from 1-5;  $c$ ,  $e$ ,  $g$ , and  $k$  independently vary from 1-20;  $R_a$ ,  $R_b$ ,  $R_c$ , and  $R_d$  are defined in the same manner as  $Y_1$ ;  $T$  is a negative charge.

3. The composition of claim 2 wherein each  $R_3$ ,  $R_4$ ,  $R_6$  and  $R_7$  is H,  $R_5$  is  $SO_3T$ ,  $Y_1$  is  $-(CH_2)_3SO_3T$ ;  $W_1$  is  $-C(CH_3)_2$ ;  $T$  is a negative charge.

4. A method for performing a diagnostic procedure which comprises administering to an individual an effective amount of the indole of formula



5

wherein R<sub>3</sub> to R<sub>7</sub>, and Y<sub>1</sub> are independently selected from the group consisting of -H, C1-C10 alkoxy, C1-C10 polyalkoxyalkyl, C1-C20 polyhydroxyalkyl, C5-C20 polyhydroxyaryl, saccharides, amino, C1-C10 aminoalkyl, cyano, nitro, halogen, hydrophilic peptides, arylpolysulfonates,

10 C6-C10 alkyl, C1-C10 aryl, -SO<sub>3</sub>T, -CO<sub>2</sub>T, -OH, -(CH<sub>2</sub>)<sub>a</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OSO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHSO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OCONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>OPO<sub>3</sub>HT,

15 -(CH<sub>2</sub>)<sub>a</sub>OPO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHPO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHPO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>,

20 -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>,

$-(CH_2)_aNHCSNH(CH_2)_bPO_3HT$ ,  $-(CH_2)_aNHCSNH(CH_2)_bPO_3T_2$ ,  
 $-(CH_2)_aOCONH(CH_2)_bPO_3HT$ , and  $-(CH_2)_aOCONH(CH_2)_bPO_3T_2$ ,  $-CH_2(CH_2-O-$   
 $CH_2)_c-CH_2-OH$ ,  $-(CH_2)_d-CO_2T$ ,  $-CH_2-(CH_2-O-CH_2)_e-CH_2-CO_2T$ ,  $-(CH_2)_f-NH_2$ ,  
 $-CH_2-(CH_2-O-CH_2)_g-CH_2-NH_2$ ,  $-(CH_2)_h-N(R_a)-(CH_2)_i-CO_2T$ , and  $-(CH_2)_j-N(R_b)-$

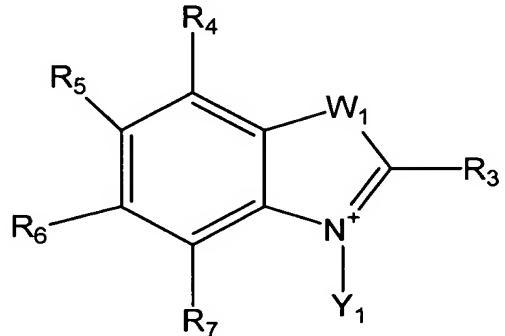
5  $CH_2-(CH_2-O-CH_2)_k-CH_2-CO_2T$ ;  $W_1$  is selected from the group consisting of  
 $-CR_cR_d$ ,  $-O-$ , and  $-NR_c$ ;  $a$ ,  $b$ ,  $d$ ,  $f$ ,  $h$ ,  $i$ , and  $j$  independently vary from 1-10;  $c$ ,  $e$ ,  
 $g$ , and  $k$  independently vary from 1-100;  $R_a$ ,  $R_b$ ,  $R_c$ , and  $R_d$  are defined in the  
same manner as  $Y_1$ ;  $T$  is either  $H$  or a negative charge.

5. The method for performing the diagnostic or therapeutic  
procedure of claim 4 which comprises administering to an individual an  
effective amount of the composition of indoles wherein  $R_3$  to  $R_7$ , and  $Y_1$  are  
independently selected from the group consisting of C1-C5 alkoxy, C1-C5  
5 polyalkoxyalkyl, C1-C10 polyhydroxyalkyl, C5-C20 polyhydroxyaryl, mono-  
and disaccharides, nitro, hydrophilic peptides, arylpolysulfonates, C1-C10  
aryl,  $-SO_3T$ ,  $-CO_2T$ ,  $-OH$ ,  $-(CH_2)_aSO_3T$ ,  $-(CH_2)_aOSO_3T$ ,  $-(CH_2)_aNHSO_3T$ ,  
 $-(CH_2)_aCO_2(CH_2)_bSO_3T$ ,  $-(CH_2)_aOCO(CH_2)_bSO_3T$ ,  $-CH_2(CH_2-O-CH_2)_c-CH_2-$   
 $OH$ ,  $-(CH_2)_d-CO_2T$ ,  $-CH_2-(CH_2-O-CH_2)_e-CH_2-CO_2T$ ,  $-(CH_2)_f-NH_2$ ,  $-CH_2-(CH_2-O-$   
10  $CH_2)_g-CH_2-NH_2$ ,  $-(CH_2)_h-N(R_a)-(CH_2)_i-CO_2T$ , and  $-(CH_2)_j-N(R_b)-CH_2-(CH_2-O-$   
 $CH_2)_k-CH_2-CO_2T$ ;  $W_1$  is selected from the group consisting of  $-CR_cR_d$ ,  $-O-$ ,  
and  $-NR_c$ ;  $a$ ,  $b$ ,  $d$ ,  $f$ ,  $h$ ,  $i$ , and  $j$  independently vary from 1-5;  $c$ ,  $e$ ,  $g$ , and  $k$   
independently vary from 1-20;  $R_a$ ,  $R_b$ ,  $R_c$ , and  $R_d$  are defined in the same  
manner as  $Y_1$ ;  $T$  is a negative charge.

6. The method for performing the diagnostic or therapeutic procedure of claim 5 which comprises administering to an individual an effective amount of the composition of indoles wherein each R<sub>3</sub>, R<sub>4</sub>, R<sub>6</sub> and R<sub>7</sub> is H, R<sub>5</sub> is SO<sub>3</sub>T, Y<sub>1</sub> is -(CH<sub>2</sub>)<sub>3</sub>SO<sub>3</sub>T; W<sub>1</sub> is -C(CH<sub>3</sub>)<sub>2</sub>; T is a negative charge.
7. The method of claim 4 wherein said procedure utilizes light of wavelength in the region of 350-1300 nm.
8. The method of claim 4 wherein said diagnostic procedure comprises monitoring a blood clearance profile by fluorescence wherein light of wavelength in the region of 350 to 1300 nm is utilized.
9. The method of claim 4 wherein said diagnostic procedure comprises monitoring a blood clearance profile by absorption wherein light of wavelength in the region of 350 to 1300 nm is utilized.
10. The method of claim 4 wherein said procedure is for physiological function monitoring.
11. The method of claim 10 wherein the diagnostic procedure is for renal function monitoring.
12. The method of claim 10 wherein the diagnostic procedure is for cardiac function monitoring.

13. The method of claim 10 wherein the diagnostic procedure is for kidney function monitoring.
  
14. The method of claim 10 wherein the diagnostic procedure is for determining organ perfusion in vivo.

15. A composition comprising a pharmaceutically acceptable formulation of an indole of formula



5 wherein R<sub>3</sub> to R<sub>7</sub>, and Y<sub>1</sub> are independently selected from the group consisting of -H, C1-C10 alkoxy, C1-C10 polyalkoxyalkyl, C1-C20 polyhydroxyalkyl, C5-C20 polyhydroxyaryl, saccharides, amino, C1-C10 aminoalkyl, cyano, nitro, halogen, hydrophilic peptides, arylpolysulfonates, C1-C10 alkyl, C1-C10 aryl, -SO<sub>3</sub>T, -CO<sub>2</sub>T, -OH, -(CH<sub>2</sub>)<sub>a</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OSO<sub>3</sub>T,

10 -(CH<sub>2</sub>)<sub>a</sub>NHSO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OCONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>OPO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>OPO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHPO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHPO<sub>3</sub>T<sub>2</sub>,

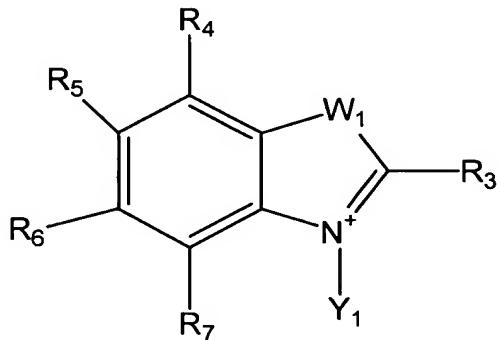
15 -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>,

20 -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>,

-(CH<sub>2</sub>)<sub>a</sub>OCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, and -(CH<sub>2</sub>)<sub>a</sub>OCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -CH<sub>2</sub>(CH<sub>2</sub>-O-CH<sub>2</sub>)<sub>c</sub>-CH<sub>2</sub>-OH, -(CH<sub>2</sub>)<sub>d</sub>-CO<sub>2</sub>T, -CH<sub>2</sub>-(CH<sub>2</sub>-O-CH<sub>2</sub>)<sub>e</sub>-CH<sub>2</sub>-CO<sub>2</sub>T, -(CH<sub>2</sub>)<sub>f</sub>-NH<sub>2</sub>, -CH<sub>2</sub>-(CH<sub>2</sub>-O-CH<sub>2</sub>)<sub>g</sub>-CH<sub>2</sub>-NH<sub>2</sub>, -(CH<sub>2</sub>)<sub>h</sub>-N(R<sub>a</sub>)-(CH<sub>2</sub>)<sub>i</sub>-CO<sub>2</sub>T, and -(CH<sub>2</sub>)<sub>j</sub>-N(R<sub>b</sub>)-CH<sub>2</sub>-(CH<sub>2</sub>-O-CH<sub>2</sub>)<sub>k</sub>-CH<sub>2</sub>-CO<sub>2</sub>T; W<sub>1</sub> is selected from the group consisting of

5 -CR<sub>c</sub>R<sub>d</sub>, -O-, -NR<sub>c</sub>, and -S-; a, b, d, f, h, i, and j independently vary from 1-10; c, e, g, and k independently vary from 1-100; R<sub>a</sub>, R<sub>b</sub>, R<sub>c</sub>, and R<sub>d</sub> are defined in the same manner as Y<sub>1</sub>; T is either H or a negative charge; with the proviso that when W<sub>1</sub> is -S-, R<sub>3</sub>-R<sub>7</sub> are not -H or C1-C10 alkyl; and Y<sub>1</sub> is not -H.

16. A method for performing a diagnostic procedure which comprises administering to an individual an effective amount of the indole of formula



5

wherein R<sub>3</sub> to R<sub>7</sub>, and Y<sub>1</sub> are independently selected from the group consisting of -H, C1-C10 alkoxyl, C1-C10 polyalkoxyalkyl, C1-C20 polyhydroxyalkyl, C5-C20 polyhydroxyaryl, saccharides, amino, C1-C10 aminoalkyl, cyano, nitro, halogen, hydrophilic peptides, arylpolysulfonates,

10 C6-C10 alkyl, C1-C10 aryl, -SO<sub>3</sub>T, -CO<sub>2</sub>T, -OH, -(CH<sub>2</sub>)<sub>a</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OSO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHSO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>NHCSNH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>OCONH(CH<sub>2</sub>)<sub>b</sub>SO<sub>3</sub>T, -(CH<sub>2</sub>)<sub>a</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>OPO<sub>3</sub>HT,

15 -(CH<sub>2</sub>)<sub>a</sub>OPO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHPO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHPO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>OCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>CONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCO(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>,

20 -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>HT, -(CH<sub>2</sub>)<sub>a</sub>NHCONH(CH<sub>2</sub>)<sub>b</sub>PO<sub>3</sub>T<sub>2</sub>,

$-(CH_2)_a NHCSNH(CH_2)_b PO_3 HT$ ,  $-(CH_2)_a NHCSNH(CH_2)_b PO_3 T_2$ ,  
 $-(CH_2)_a OCONH(CH_2)_b PO_3 HT$ , and  $-(CH_2)_a OCONH(CH_2)_b PO_3 T_2$ ,  $-CH_2(CH_2-O-$   
 $CH_2)_c-CH_2-OH$ ,  $-(CH_2)_d-CO_2 T$ ,  $-CH_2-(CH_2-O-CH_2)_e-CH_2-CO_2 T$ ,  $-(CH_2)_f-NH_2$ ,  
 $-CH_2-(CH_2-O-CH_2)_g-CH_2-NH_2$ ,  $-(CH_2)_h-N(R_a)-(CH_2)_i-CO_2 T$ , and  $-(CH_2)_j-N(R_b)-$

5  $CH_2-(CH_2-O-CH_2)_k-CH_2-CO_2 T$ ;  $W_1$  is selected from the group consisting of  
 $-CR_c R_d$ ,  $-O-$ ,  $-NR_c$ , and  $-S-$ ;  $a$ ,  $b$ ,  $d$ ,  $f$ ,  $h$ ,  $i$ , and  $j$  independently vary from 1-10;  
 $c$ ,  $e$ ,  $g$ , and  $k$  independently vary from 1-100;  $R_a$ ,  $R_b$ ,  $R_c$ , and  $R_d$  are defined in  
the same manner as  $Y_1$ ;  $T$  is either H or a negative charge; with the proviso  
that when  $W_1$  is  $-S-$ ,  $R_3-R_7$  are not  $-H$  or C1-C10 alkyl; and  $Y_1$  is not  $-H$ .